JOEL ON SOFTWARE

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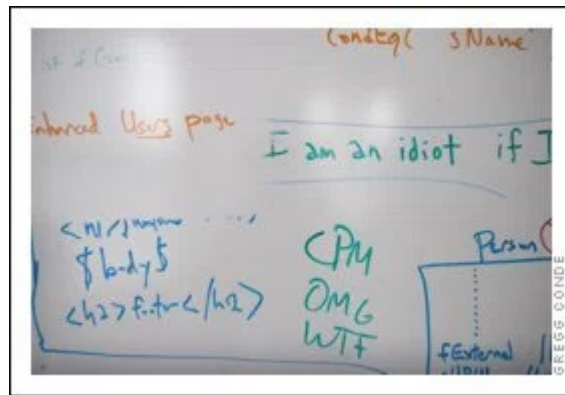
Sorting Resumes

☐   RECRUITER, ARTICLES

The standard job application of cover letter plus resume is a phenomenally weak way to introduce a candidate. They give you only the faintest clues as to the quality of an applicant.

Sometimes, though, a resume gives pretty strong *negative* clues which allow you to screen out applicants without going much further. Once I got a resume from someone who claimed to be an expert in Microsoft Window [sic] programming. Another time the only experience listed on the application was a job at Dunkin' Donuts. That resume did a pretty good job of following all the suggestions that high school career-guidance advisors love to give out (this guy "managed trays of donuts") but there was not a smidgen of evidence that the applicant had ever seen a computer.

Other than that, though, it can be extremely hard to tell much about a candidate from a resume. Our policy at Fog Creek, then, has three parts:

1. We try to be selective about how we advertise our jobs, so as to limit the amount of noise in the resume pile.

2. We certainly don't hire based on resumes; we only screen *out* based on resumes to reduce the number of people whom we have to interview.

3. In order to sort the remaining resumes to decide what order to interview people, we use a strictly objective system of reviewing and scoring them, so at least we are being fair and consistent in our interpretation of that very weak signal that comes from resumes.

There are several fairly objective measures that we look at, again, *solely for the purpose of sorting resumes* so that the first people we call are the ones that are most likely to work out.

Passion. We look for evidence that the applicant is passionate about computers and really loves programming. Typical evidence of this:

- Jobs with computers or experience programming going back to a very early age. Great programmers are more likely to have spent a summer at computer camp, or building an online appointment scheduler for their uncle the dentist, rather than working at Banana Republic folding clothes.

- Extra-curricular activities. People who love programming often work on their own programming projects (or contribute to an open-source project) in their spare time.

- Waxing rhapsodic in their cover letter about how they were moved to tears by The Structure and Interpretation of Computer Programs.

- Sometimes certain programming languages or technologies on a resume indicate evidence of someone who loves programming enough to explore new technologies. At the time I'm writing this, seeing Ruby on a resume is a good sign of the kind of programmer who loves to check out the latest thing and try to improve their skills because they're passionate about programming, because not so many employers are really demanding Ruby yet. You have to be careful here; in 1996 Java on a resume was a sign of the same passion, but today it adds almost no information.

Pickiness. We look closely at the cover letter for evidence that the applicant really wants to work for *us.* We don't want to see a generic cover letter talking about me, me, me: we want to see a coherent argument as to why they've thought about this seriously and concluded that Fog Creek is the place they want to work.

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There are two reasons for using this as a clue. First, it's a sign that the candidate is not applying to hundreds of jobs at the same time. The fact that they took the time to learn about Fog Creek and wrote a custom cover letter just for us means that they have a lot of confidence in their abilities, so they're applying to a select few employers, not bulk mailing a thousand. A bulk-mailed resume can be a symptom of desperation. More importantly, a custom cover letter is a sign that if we *do* make this candidate an offer, they're likely to accept it. That improves our yield. If I only have time to interview six people, all else being equal, I'd rather interview six people who really want to work for Fog Creek, not generic smart people that are also applying to a hundred other jobs. All else being equal.

English. Scoring resumes by English skills was a hard decision for us to make, because computer programming is one of those fields where an immigrant who doesn't speak English can still be a brilliant programmer. That said, years of experience working with programmers have taught me that programmers who can communicate their ideas clearly are going to be far, far more effective than programmers who can only really communicate well with the compiler. It is crucial for documenting code, it is crucial for writing specifications and technical design documents that other people can review, and it's crucial even for those meetings where you sit around discussing how to do something best: brilliant programmers who have trouble explaining their ideas just can't make as much of a contribution. In this particular category, we also consider the neatness and orderliness of their resume. A disorganized resume rife with grammatical errors where nothing lines up is a pretty big red flag for a disorganized thinker or just general sloppiness; for many jobs this can be fine but not for software development. In particular we usually completely disqualify resumes that are full of English mistakes. It's not that hard, even for a non-native speaker, to find someone to check your resume, and failure to do that usually reflects a profound lack of concern over the quality of the things that you do. That said, we try to be considerate of non-native speakers who are nonetheless excellent communicators: leaving out articles in that charming Eastern European way, or starting every paragraph with "So" in charming Pacific Northwestian way, is not a showstopper.

Brains. In this category we're looking for evidence that a candidate is, well, smart, or at least, the kind of nerdy brainiac that went to math camp. Signs of

this include high GPAs, high standardized test scores, honors societies like Phi Beta Kappa, people who participate in Top Coder competitions, play competitive chess, or go to ACM Programming contests.

Selectivity. Another thing we look for on resumes is evidence that someone has gone through some highly selective process in the past. Not everyone at Ivy League schools is worth hiring, and not everyone at community college is worth avoiding, but getting into a very selective school does at least mean that *someone, somewhere* judged you using some kind of selection process and decided that you were pretty smart. Our company criterion for selectivity is usually getting into a school or program that accepts less than 30% of its applicants (there are about 60 schools in the US that meet this standard), or working for a company which is known to have a difficult application process, like a whole day of interviews. Highly selective branches of the military like officer's training or pilot's courses, or even just getting into the Marines indicates someone that has made it through some kind of difficult application/selection procedure and all in all this is a positive sign.

Hard-core. For experienced programmers, there are certain technologies that are considered somewhat more hard-core than others, simply because they are, well, harder to do well. Again, this is a pretty weak indicator, but all else being equal, I'm more impressed by someone who has done work in OCaml than someone who has worked in Java. Assembler or device-driver or kernel work is somewhat more impressive than Visual Basic or PHP. C++ with ATL is harder than Perl. People who have worked on operating systems or compilers are more hard core than people who have worked on simple database front-ends.

I'm sure that this will be seen as incendiary; after all, most of my personal programming experience in the past five years is with VBScript, which is sort of like a version of Visual Basic dumbed down for people with severe brain trauma. Remember again that I said that resumes are a very weak way of judging programmers and you only get the faintest signals from them; that said, some